#### **DISASTER MANAGEMENT**

### At the Local Level...

Disasters always occur at the local level. For some types of natural disasters, like slow-rising floods or approaching hurricanes, warning is available. Other disasters, like earthquakes, happen with little or no warning. The citizens in the area where the event occurs and their local governments and voluntary agencies are the first to have to cope with the damage.

The local government maintains control of all assets used in the response and recovery efforts, regardless of the source of those assets. Local governments must plan and prepare for this role with the support of the State and Federal



Wright, WY Tornado August 2005

## Local response includes . . .

- 1. Acting as the primary "first provider" of emergency response services.
- Activating the Emergency Operations Center (EOC) and Comprehensive Emergency Management Plan.
- 3. Coordinating the response with public and private organizations and agencies.
- Notifying the State Emergency Management Agency of the situation by regularly submitting Situation Reports (SITREP).
- 5. Activating necessary local governments and organizations that are signatories to mutual aid compacts.

- 6. Activating response agreements with State and Federal departments or agencies.
- 7. Proclaiming a local state of emergency to authorize:
- Using local resources
- Expending local funds
- Waiving the usual bidding process for goods and services
- 8. Requesting the State Homeland Security/Emergency Management Agency to provide State and/or Federal assistance.

### At the State Level...

When a local jurisdiction does not have the resources it needs to respond to a disaster, it turns to the State government for assistance. The State government may have many local jurisdictions requesting aid at the same time.

State governments serve as agents for the local jurisdictions if Federal disaster assistance is needed. Local governments cannot directly access Federal programs.



## State response includes . . .

- 1. Monitoring the situation.
- 2. Reviewing and evaluating local:
  - SITREPs
  - Response efforts
  - Requests for assistance
- 3. Activating the State EOC to coordinate available State assistance.
- 4. Determining if the situation is beyond the capability of the State and if Federal assistance is needed.
- 5. Proclaiming a state of emergency by the Governor that:
  - Activates the State Disaster Preparedness Plan
  - Provides for the use of State assistance or resources

- Begins the process for requesting Federal assistance
- 6. Requesting Federal assistance. Requests can include:
  - A request for "emergency" or "major disaster declaration" under the Robert T. Stafford Disaster Relief and Emergency Assistance Act, as amended, or
  - A request to Federal agencies under their own authorities from existing or emergency rooms, such as the Small Business Administration (SBA) or the Department of Agriculture
     \*USDA)

## At the Federal Level...

When a disaster strikes and is so severe that the local government and the State government together cannot provide the needed resources, then the Federal Government becomes the source for those resources. The Federal Emergency Management Agency (FEMA) is the Federal agency that coordinates the activation and implementation of the National Response Framework (NRF), so the States work with FEMA to access Federal programs and support.



Fremont County, WY Flood June 2010

## Federal response includes...

- 1. Conducting Joint PDAs with State and local governments to identify:
  - Damage to individuals, farms, and businesses
  - Damage to public agencies, special districts, and private nonprofit organizations
  - Potential mitigation activities that can occur during repairs and before another disaster
- 2. Approving or denying requests for Federal assistance. If approved:
  - Assigns a Federal Coordinating Officer (FCO) to head the Incident Management Assistance Team (IMAT)
  - Sets up a Joint Field Office (JFO) to coordinate response and recovery efforts
  - Works with the State Coordinating Officer (SCO) to address response and recovery efforts

- 3. Activating the procedures outlined in the NRF (the NRF determines how the resources of Federal agencies and the American Red Cross will coordinate their efforts to provide immediate response assistance)
- 4. Establishing an Emergency Support Team (EST) to monitor operations from Washington
- 5. Identifying the necessary Emergency Support Functions (ESFs) to respond

# Outline of State Emergency Response and Recovery Activities

When a State responds to a disaster, it commonly does so in four action phases:

- **1.** Threat or Impact
- 2. Initial Assessment
- 3. Response
- **4.** Recovery

Certain key activities should occur, and they are included here as a checklist you can use when a disaster occurs in your State.

#### PHASE 1: THREAT OR IMPACT

## A DISASTER IS THREATENING AREAS OF YOUR STATE, OR A SUDDEN-IMPACT EVENT HAS OCCURRED.

- Inform the Governor.
- Activate the ERP (elements as needed) and the EOC.
- Assess the need for immediate lifesaving measures, such as:
  - ✓ Evacuations
  - ✓ Shelter
  - ✓ Urban search and rescue
- Establish liaisons with affected jurisdictions to initiate local damage assessments and receive briefings from local agencies on:
  - ✓ The current situation
  - ✓ Initial Response activities
- Issue emergency or disaster proclamations by local officials or the Governor.
- Deploy State resources, including
  - ✓ Requesting assistance from relief organizations
  - ✓ Activating mutual aid agreements as applicable
- Issue assurances to the public
- > Evaluate the need for Federal assistance and the consequences.
  - ✓ Identify specific needs and types of assistance that cannot be furnished by State and local resources
  - ✓ Prepare to make future commitments when requesting outside assistance.
- Request a Presidential Disaster Declaration and Federal disaster assistance through the Office of the Governor.

## **PHASE 2: INITIAL ASSESSMENT**

#### THE MAGNITUDE OF THE DISASTER IS NOT KNOWN.

- Assess the magnitude of the disaster by identifying:
  - ✓ What needed to be done and when
  - ✓ How to protect people, the environment, and property from future damage
- > Notify all appropriate parties, such as:
  - ✓ The Governor
  - ✓ Local governments
  - √ Response agencies
  - √ Support agencies
  - ✓ The public
  - ✓ The media
- > Mobilize necessary resources.
- > Activate the EOC and arrange for needed staff.

#### **PHASE 3: RESPONSE**

## AS LOCAL JURISDICTIONS REPORT THEIR STATUS AND REQUEST ASSISTANCE, THE STATE COMMITS ITS RESOURCES TO RESPONSE.

- > Activate a "Crisis Action Team" or similar State team.
  - ✓ Identify whether a smaller crisis management team (partial activation of the EOC) can manage the disaster or whether the situation warrants full activation of the EOC.
- Assess the situation by determining:
  - ✓ The jurisdictions involved
  - ✓ The potential that other jurisdictions will be impacted and when
  - ✓ Existing emergency conditions
  - ✓ Existing dangerous situations
  - ✓ Necessary life-support resources
  - ✓ The status of emergency responders and resources, such as:
    - What has been or is being committed
    - The types and locations of backup resources, personnel, and inventories
- Identify tasks by determining:
  - ✓ What activities are currently underway.
  - ✓ What activities need to be done now.
  - ✓ What activities need to be done in the next 12 hours, 24 hours, 48 hours, etc.
- Activate Emergency Public Information procedures, such as:
  - ✓ Using the Emergency Alert System (EAS)
  - ✓ Setting up a Joint Information Center (JIC)
- ➤ Initiate the assessment, documentation, and legal steps for declaring a state of emergency or disaster.
- ➤ Issue a declaration from the Governor. A timely declaration acknowledges the severity of the situation and ensures that assistance will be prompt.
- > Determine whether the situation warrants Federal assistance.
- Conduct Joint Preliminary Damage Assessments (PDAs).
- Request Federal assistance.

### **PHASE 4: RECOVERY**

## THE IMMEDIATE RESPONSE TO THE DISASTER IS OVER; SHORT-TERM AND LONG-TERM RECOVERY BEGINS.

- Determine the terms of assistance in the FEMA/State Agreement.
- Meet with the Federal Coordinating Officer (FCO).
- Prepare for Federal/State Meeting.
- > Establish Disaster Recovery Center (DRC) locations, if used.
- ➤ Disseminate disaster information to the media and the public through the Joint Information Center (JIC).
- Coordinate outreach efforts with community relations staff.
- > Begin infrastructure support by:
  - ✓ Establishing Public Assistance (PA) Briefings (State Public Assistance Officer)
  - ✓ Coordinating receipt of Requests for Public Assistance (RPA).
  - ✓ Participating with FEMA in Kick Off Meetings with PA applicants.
  - ✓ Assisting local jurisdictions with Project Worksheets (PW).
- Conduct mitigation efforts by:
  - ✓ Establishing the Interagency Mitigation Team.
  - ✓ Completing Mitigation Report.
  - ✓ Beginning the Hazard Mitigation Grant Program (HMGP).
- Produce the State Hazard Mitigation Plan.

#### DAMAGE ASSESSMENTS

#### **Rapid Needs Assessment**

The rapid needs assessment provides the first description of the type and extent of damages and associated impacts sustained by the community.

Depending on the magnitude of the event, an RNA can be conducted by local officials, specially trained State RNA Teams, or joint Federal/State RNA or disaster assessment teams.

The goal of the rapid needs assessment is to determine the scope of disaster.



Wright, WY Tornado August 2005

- How bad is it?
- What areas are affected?
- How many people are affected?
- What are the risks to life, safety, and health?
- What is the status of lifeline services?
- How many homes and businesses are not insured or are underinsured?

The above information can be provided on Situation Reports.

The purpose of the rapid needs assessment is to provide quick and accurate information to State officials to enable them to determine whether State and /or Federal assistance is warranted and to what extent resources are needed. This information can be used by the State making the decision to request a Preliminary Damage Assessment (PDA) and, ultimately, in the Governor's decision to request a Federal disaster declaration.

#### **Preliminary Damage Assessment**

PDAs have a broader scope and are conducted over a longer time span than RNAs.

The PDA is a specific process used to gather supporting information for the Governor's request for a Presidential Disaster Declaration. The PDA is conducted after the State determines that the response to the disaster exceeds the local and State resources and ability to respond to the needs of victims.

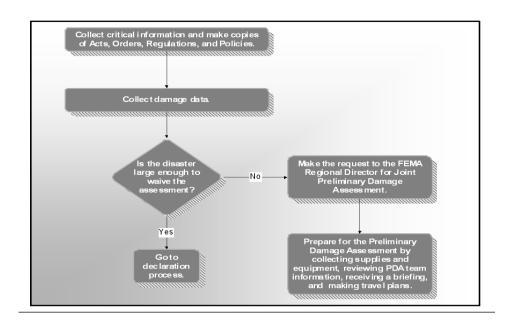
A PDA may take several days or weeks to establish the official estimates of damage levels to homes, businesses, and infrastructure, and the dollar values of losses. The PDA includes the overall economic impact, demographic information, comparison of insured vs. uninsured losses, and the commitment level of local and State resources.

A team of local, State, and Federal personnel conducts a PDA. In a "garden variety disaster" when losses are relatively light, the PDA process is needed by officials to justify the request for assistance from a specific Federal disaster program.

Catastrophic disasters often result in an expedited declaration that enables the President to bypass the PDA process initially. Assistance and resources that are needed move into the area quickly. The PDA is completed later to document the scope of the disaster, determine additional resource needs, aid in Joint Field Office (JFO) staffing decisions, and locate Disaster Recovery Centers (DRC).

The documentation process starts during the PDA and is important during the several years it takes to close big disasters. Do not shortcut the PDA process just because you received an expedited declaration.

The formal damage assessment process may not officially start for several days, but the foundation needs to be in place as soon as there is an indication that a request for a Federal disaster declaration will be made.



### THE DECLARATION PROCESS

When a disaster occurs and local and State jurisdictions realize they will need resources to manage it, the Governor of the State asks for a Federal Declaration of an emergency or disaster. The President then grants or denies the request.

There are three types of disaster declarations:

- **1** Emergency
- 2. Major Disaster
- **3■** Expedited



Cheyenne, WY Flood 1985

## **Emergency**

Emergency, as defined by the Robert T. Stafford Disaster Relief and Emergency Assistance Act, is:

"Any occasion or instance for which, in the determination of the President, Federal Assistance is needed to supplement State and local efforts and capabilities to save lives and to protect property and public health and safety, or to lessen or avert the threat of a catastrophe in any part of the United States."

Emergency assistance differs from disaster assistance. It is intended to avert a catastrophe through the support of emergency actions. It does not include any restoration or permanent repairs.

An emergency does not have to be a natural disaster. For example, it may be a water system contamination that cannot be handled by local and State resources.

#### Characteristics

- Beyond State and local capabilities
- 2. Supplementary emergency assistance
- 3. Not to exceed \$5 million
- 4. Must request within 5 days of the incident

## **Major Disaster**

Major Disaster, as defined by the Stafford Act, is:

"Any natural catastrophe including any hurricane, tornado, storm, high water, winddriven water, tidal wave, tsunami, earthquake, volcanic eruption, landslide, mudslide, snowstorm, or drought, or, regardless of cause, any fire, flood, or explosion in any part of the United States which in the determination of the President causes damage of sufficient severity and magnitude to warrant major disaster assistance to supplement the efforts and available resources of States, local governments, and disaster relief organizations in alleviating the damage, loss, hardship, or suffering caused thereby."

#### Characteristics

- Beyond State and local capabilities
- 2. Supplementary to available resources of State and local governments, disaster relief organizations, and insurance
- 3. Must request within 30 days of the incident

## **Expedited Request**

In cases where a major disaster is of "unusual severity and magnitude," field assessments may not be necessary to determine the necessity of Federal assistance. The Governor or Acting Governor may send an abbreviated request that does not need to include estimate damages or amount of expected Federal assistance.

#### **Characteristics**

- 1. Catastrophes of unusual severity and magnitude
- Supplementary to available resources of State and local governments, disaster relief organizations, and insurance
- 3. Requested in most expeditious manner

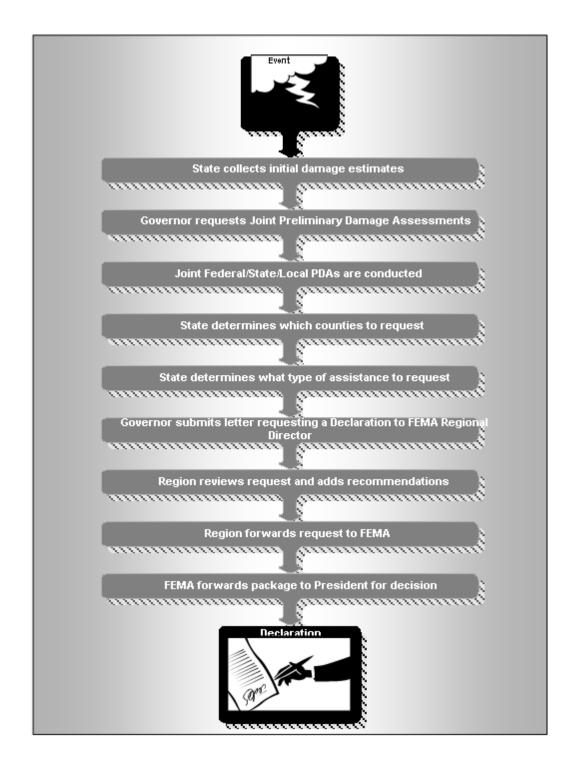
### Governor's Request provides: Expedited Request provides:

- Certification that the severity and magnitude of the disaster exceed State and local capabilities
- Certification that Federal assistance is necessary to supplement the efforts and available resources of the State, local governments, disaster relief organizations, and compensation by insurance for disaster-related losses
- 3. Confirmation of State emergency plan execution
- 4. An estimate of the amount and severity of damages and losses, stating the impact of the disaster on the public and private sectors
- Information describing the nature and amount of State and local resources that have been or will be committed to alleviate the results of the disaster
- 6. Preliminary estimates of the types and amount of supplementary Federal disaster assistance needed under the Stafford Act
- 7. Certification by the Governor that State and local government obligations and expenditures for the current disaster will comply with all applicable cost-sharing requirements of the Stafford Act

Certification that the severity and magnitude of the disaster exceed

State and local capabilities

- 2. Certification that Federal assistance is necessary to supplement the efforts and available resources of the State, local governments, disaster relief organizations, and compensation by insurance for disaster-related losses
- 3. Confirmation of State emergency plan execution
- Information describing the nature and amount of State and local resources that have been or will be committed to alleviate the results of the disaster
- 5. Certification by the Governor that State and local government obligations and expenditures for the current disaster will comply with all applicable cost-sharing requirements of the Stafford Act



### Add-Ons

After a declaration is made, the State may receive additional damage information. If the damage is severe, the State may request that additional counties be included in the declaration.

Occasionally, requests are denied, and the State may request a review of the denial through an appeals process.

### **KEY STEPS IN THE RECOVERY PROCESS**

#### Step 1: The Governor requests Federal assistance.

If the President denies Federal assistance, the cost of recovery is the responsibility of the State and local governments.

If the President declares an Emergency or Major Disaster Declaration, all of the provisions or applicable sections of Public Law 93-288 (as amended by Public Law 100-707), the Robert T. Stafford Disaster Relief and Emergency Assistance Act of 1988, apply.

#### Step 2: The State and FEMA establish the JFO.

The President assigns an FCO to manage Federal activities.

The Governor assigns a SCO and a Governor's Authorized Representative (GAR) to work in partnership with Federal officials and represent the State's interest.

# Step 3: FEMA, the State, and local governments determine whether DRCs are needed for individuals to visit to gather information. (A result of an Individual Assistance Declaration.)

## Step 4: FEMA and the State coordinate with locals to conduct PA Applicants' Briefings.

The PA Applicants' Briefings are for the officials of cities, counties, special districts, public agencies, and private nonprofit organizations.

The briefings explain the types of Public Assistance available, application procedures, program eligibility, and deadlines.

#### Step 5: Prospective applicants fill out an RPA.

The Request for Public Assistance (RPA) form tells the type of damage the applicant incurred.

Based on this information, joint Federal, State, and local teams will be developed to conduct Damage Survey Reports (DSRs).

#### Step 6: Prospective applicants appoint an "Applicant's Agent"

The applicant's agent is the Point of Contact (POC) and is the only official who can make requests for funds on behalf of the applicant.

The applicant assigns a person to work with the team who is knowledgeable about:

- The damage sites
- How the work will be completed, either by the applicant or through an outside contract

#### Step 7: Detailed PWs are written by the teams.

The Project Worksheet (PW) becomes the basis for a project application.

## Step 8: FEMA and the State work with the applicant on hazard mitigation and insurance requirements.

## Step 9: FEMA and the State approve or disapprove project applications.

If approved:

- Relevant State Requirements are applied and forwarded to the applicant.
- Deadlines are established.

If time extension or project modifications are required, the applicant must notify the State for possible approval. Extensions are usually granted for situations beyond the control of the applicant. Extensions are not usually granted for administrative delays.

## Step 10: Each quarter the applicant will submit a status report to the State for large projects that are not yet finished.

# Step 11: When a project is complete, within 30 days of completion, the applicant must submit a "Summary of Documentation" for the Project Worksheet.

The State will assign engineers to conduct final inspections, when necessary.

## Step 12: The State will work with the applicant for final payment and closeout.

Audits are conducted in compliance with the Single Audit Act. If the applicant disagrees with the findings or approvals, the applicant can appeal within 30 days.



Fremont County, WY Flood June 2010

#### FINANCIAL AND ADMINISTRATIVE REQUIREMENTS

### **Documentation**

Documentation is the key to success in disaster finance issues

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The Federal Government pays its share to the State on a reimbursement basis for documented expenditures. In theory, if you have not already paid for the expense, you will not receive money from the Federal Government. In practice, payment comes to the State as a grantee, and it must be spent within three days based on approved invoices. The State passes funds to its sub-grantees (local governments).

Keep track of response plan, damage, and financial details during the entire Response and Recovery (RR) phase. Documentation must begin as soon as the disaster occurs. If you know a disaster is possible from weather and storm forecasts, consider sending notice to local jurisdictions and other State/local agencies reminding them to begin collecting data.

The checklist provides key items that should be included in your documentation.

#### Documentation should include:

Date and time

- The incident began
- Each responder was notified and "on station"
- Of all news releases and Emergency Alert System messages
- Of each injury, loss of life, and loss of property
- Of mitigation actions and recommendations
- Of man-hours expended and disaster-related expenses

Time and description of each State and local response action

Date, time, and response action for each request for assistance

Audio- and/or videotaping and pictures of the disaster

Dates, times, and transcripts of all news briefings

Damage data and subsequent spreadsheets

Damage survey efforts

Personnel rosters

Situation Reports (SITREP)

Event log

## **Organizing Documentation**

The best method for accurate project documentation is to establish a separate file for each project worksheet (PW) and keep in it all original materials pertaining to the project.

If original source documents such as time sheets, canceled checks, etc., cannot be retained in this file, put copies of these documents in the file with a notation regarding the location of the originals, because they will be needed if there is an audit.

#### Create separate files for the following:

PicturesRental/lease agreements

InvoicesContract documents

Daily Activity Reports
 Insurance information

Materials from stock

• Approved Requests for Public Assistance (RPA)

Your files should stand alone. An auditor should not have to ask someone to explain each document or expense. As you prepare the records, ask yourself, "Will someone who didn't go through the disaster understand the records?"

## **Common Audit Findings**

FEMA may audit all of your financial records for a disaster. Certain issues cause problems in the audits, and States must provide additional information or reimburse the Federal Government if justification of the expense is not shown.

If you are aware of the most common audit findings, you can plan your documentation and provide the justification you need initially. You can avoid these problem areas by planning ahead.

#### **Common Audit Findings**

- 1. Failure to support costs claimed
  - This is the biggest area of audit findings. If the documentation is not there, FEMA doesn't pay.
- 2. Claims in excess of actual costs or costs not consistent with normal/ customary practice
  - FEMA will pay you dollar for dollar the cost of rebuilding your communities nothing more, nothing less. A frequent example of this is fringe benefits with respect to overtime (OT). The fringe benefits rate is much lower for OT than for straight time.

#### 3. Eligibility Issues

- The damage must be the result of the disaster.
- The damaged facility must be in the declared disaster area.
- Repairs to property must be the legal responsibility of the applicant.
- Private roads or a bridge must span the boundary between jurisdictions.
- 4. Failure to offset cost with insurance proceeds
  - FEMA assistance is supplemental to all other sources.
- 5. Salvage value or unused material must be credited to cost of projects.
  - For example, a State purchased an excessive number of power poles and transformers. FEMA doesn't pay for the unused items.
- 6. Excessive or unreasonable charges
  - FEMA or local equipment rates should be charged. FEMA won't challenge the use of a 24-foot boom truck versus a 16-footer. But FEMA will challenge it if a stepladder would suffice.
- 7. Improper contracting
  - Contracting must be consistent with established policy and procedure. FEMA likes to avoid "cost plus" and "time and material" contracts.
- 8. Improved projects
  - FEMA will put it back as it was—where it was. FEMA will restore a damaged structure to its original size and function. If your civic center was a warehouse the day before the disaster, FEMA will rebuild a warehouse. FEMA will not replace concrete with marble.

## **DISASTER ASSISTANCE PROGRAMS**

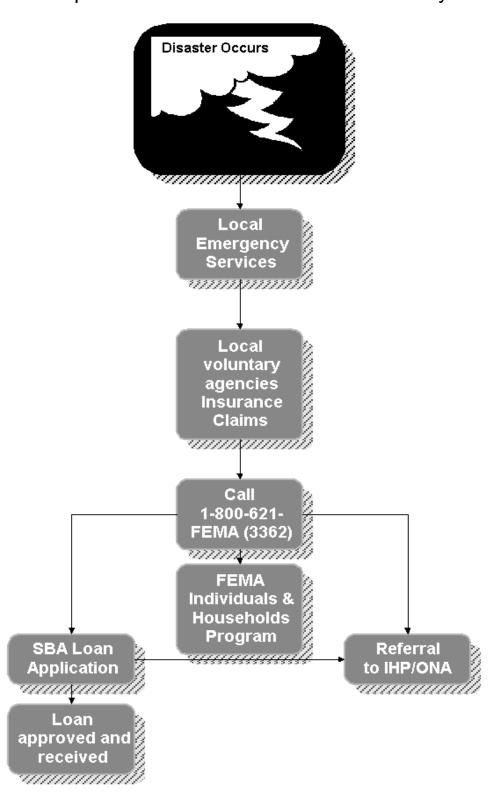
## Individual Assistance Programs

When disaster strikes, individuals, families, and businesses feel the impact physically, financially, and emotionally.

All disaster victims can receive assistance to help them recover from the event. The purpose of IA programs is not to make all the victims whole again, but to help them recover a basic, safe living environment.

IA Programs include:	
1. Emergency Assistance	8. Disaster Unemployment Assistance (DUA)
2. Insurance Information	
	9. Farm Service Agency
3. Individuals and Households Program (IHP), including Housing Assistance (HA) and Other Needs	10. Legal Assistance
Assistance (ONA)	11. Social Security Benefits
4. Home/Personal Property Disaster Loans	12. Veterans Benefits
	13. Consumer Services
5. Business Disaster Loans	
C. Crisis Courselling (CC)	14. Aging Services
6. Crisis Counseling (CC)	15. Cora Brown—only in special
7. Tax Assistance	circumstances

## Sequence of Individual Assistance Delivery



## **Public Assistance Programs**

#### Who is Eligible?

The Robert T. Stafford Disaster Relief and Assistance Act and implementing regulations define eligible applicants as:

- State government agencies
- Local governments
- Political subdivisions, such as special districts
- Native American and Eskimo tribes or tribal organizations
  - The Bureau of Indian Affairs (BIA) must recognize the tribal organizations as listed tribes.

Also eligible are certain Private Non-Profit (PNP) organizations.

Examples of eligible PNPs include educational institutions, utilities, hospitals, custodial care, and emergency medical services.

An eligible PNP must:

- Have an Internal Revenue Service (IRS) or State certification as a PNP
- Be open to the general public
- Be a facility that provides essential governmental services.

## What is Eligible?

For damages to be repaired with PA funds, the following conditions must apply:

- The property must be located within the disaster area.
- The damage must be the direct result of the disaster.
- The facility must be the responsibility of the legal applicant.
- The agency/owner must not be eligible to receive compensation from another Federal agency.

## **Categories of Work**

#### **Emergency Work:**

Category A: Debris Removal

Category B: Emergency Protective Measures



Wright, WY Tornado August 2005

Debris Removal is an extremely high priority item with FEMA, and should be with State and local governments as well. The potential is high for waste, fraud, and abuse. Local governments sometimes spend a great deal of money that is never reimbursed. Know what you are doing when you contract for debris services. FEMA does not certify or approve any contractor, nor does any contractor have authority to make eligibility determinations. Costs must be reasonable.

#### **Permanent Work:**

Category C: Road Systems

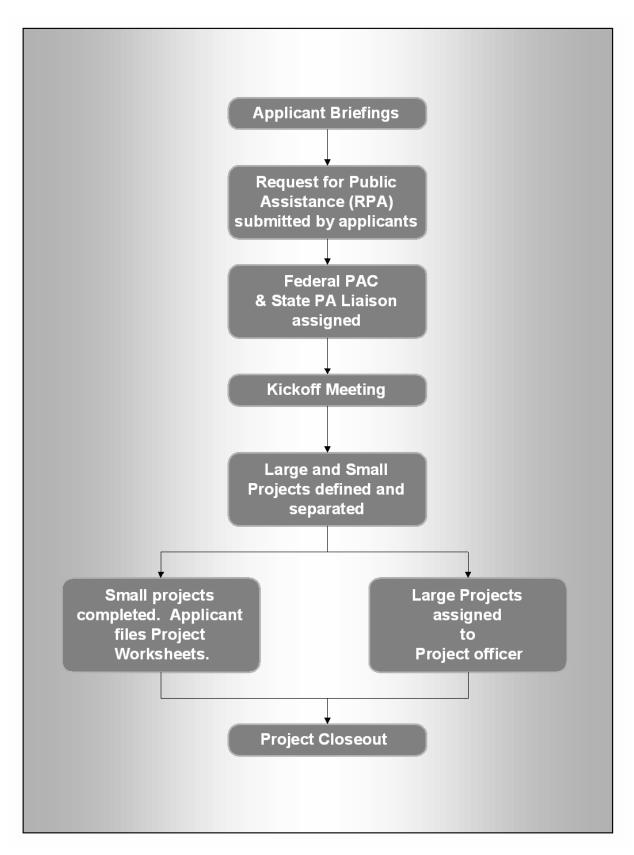
Category D: Water Control Facilities

Category E: Public Buildings and Equipment

Category F: Public Utilities

Category G: Parks, Recreational, and Other

## **Public Assistance Process**



## FEMA's 406 Hazard Mitigation Program

FEMA's 406 Program refers to the Public Assistance (PA) program that cost-shares the repair of damaged facilities and infrastructure with eligible applicants. Under this program, mitigation measures are applied on the parts of the facility that were actually damaged by the disaster, and the mitigation measure provides protection from subsequent events.

The mitigation work must be cost effect and be reasonably performed as part of the work or measure which will reduce the potential for damage to a facility from a disaster event. FEMA must approve proposed hazard mitigation projects prior to funding.

All repairs must be made to applicable codes and standards, and damaged facilities can be improved for mitigation purposes if technically feasible, cost-effective, and environmentally sound. FEMA may prescribe codes and standards where they are lacking. Each repair must be generated by a Project Worksheet (PW). Mitigation staff duties include:

- Reviewing PWs for mitigation opportunities
- Making recommendations based on reviewing the PW
- Ensuring that the solution is physically part of the damaged facility

Mitigation measures must be determined to be cost effective. Any one of the following means may be used to determine cost-effectiveness:

- Mitigation measures may amount up to 15% of the total eligible cost of the eligible repair work on a particular project.
- 2. Certain mitigation
  measures determined cost
  effective, as long as the
  mitigation measure does
  not exceed 100% of the
  eligible cost of the eligible
  repair work on the project.
  See list below.



Sheet piling and riprap protecting improved property.

- For measures that exceed the above costs, the Grantee or subgrantee must demonstrate through an acceptable benefit/cost analysis methodology that the measure is cost effective. FEMA's Benefit Cost Analysis (BCA) software provides appropriate benefit/cost analysis methodologies. The benefit cost analysis will be based on a comparison of the total project cost to the total cost of the following projected benefits:
  - a) Damage to the facility and its damaged contents,
  - b) Emergency protective measures required as a result of that damage.
  - c) Temporary facilities required due to the damage,
  - d) Loss of function,
  - e) Casualty (loss of life and injury), and
  - f) Cost avoidance (damages avoided in the future due to mitigation measures)

#### 406 PROGRAM — PRE-APPROVED PROJECTS

#### Infrastructure Systems

#### Drainage/crossings and bridges

- Drainage structures
- Culverts
- . Headwalls and wing walls
- Low-water crossings
- · Gabion baskets, riprap, sheet piling, and geotextile fabric installation
- Restraining cables on bridges

#### Sanitary and storm sewer systems

- Access covers
- Sewer lines
- Pump stations

#### Wastewater treatment plants

- Elevation of equipment and controls that can be elevated easily
- Dry or wet flood-proofing of buildings

#### Potable water

- Well systems
- Raw water intakes
- Water treatment plants

#### Electric power distribution

- Pad-mounted transformers
- Using multiple poles to support transformers
- Anchoring or otherwise protecting fuel tanks from movement in a disaster
- Replacing damaged poles with higher-rated poles, of the same or different material such as replacing wood poles with precast concrete or steel
- Adding guy wire or other additional support to power lines
- Removing large diameter lines from poles
- Providing looped distribution service or other redundancies in the electrical service to critical facilities

#### Above-ground storage tanks

- Strengthening or stiffening base connections.
   Installation of self-initiating disconnects and shut-off valves

Underground pipelines - Installation of shut-off valves so that damaged sections of pipeline can be isolated

#### 406 PROGRAM — PRE-APPROVED PROJECTS

#### **Buildings - General**

#### General effects of flood damage

- Buildings substantially damaged under NFIP regulations—Repair, dry flood-proofing, or elevation
- Buildings not substantially damaged under NFIP—If technically feasible, dry flood-proofing

#### Roofs

- Low-slope roofs
- Curbing and flashing
- Damage to soffits, overhangs, roof openings
- Roof-mounted equipment should be attached to a foundation that will resist expected wind forces
- Hurricane clips

**Shutters** - In areas subject to hurricane winds, shutters are appropriate in the following areas:

- All windows on critical facilities such as hospitals
- The lower floors of buildings with windows most likely to be struck by debris
- Windows of buildings with very high value contents such as libraries and document centers that can be damaged by water
- Windows of buildings subject to debris from nearby ballasted roofs, metal buildings, manufactured homes or other structures likely to fail and result in debris

#### Anchoring

- Anchoring of mechanical and electrical in critical facilities
- Anchoring smaller ancillary buildings to prevent toppling

Flexible piping - Installation of flexible piping at pipe/conduit connections to equipment to accommodate expected movement in an earthquake

#### Bracing

- Bracing of overhead pipes and electrical lines to meet seismic loads
- Bracing interior walls and partitions that could collapse, preventing safe exit from the building
- · Bracing parapets, anchoring veneer or

cladding, and bracing other non-structural elements that could collapse and cause injury or block safe exit of a building during an earthquake

**Replacement of glass -** Replacement of glass with impact-resistant material

#### General buildings

- Buildings Where spread footings have been undercut by scour
- Siding If siding has been damaged by wind
- Venting Where there has been water damage caused by water intrusion through venting

#### Doors and windows

- Where damage has resulted from wind and water intrusion around weather stripping on doors and/or windows
- Where damage has been caused by windinduced failure of doors

#### Miscellaneous structures

- Marine Piers If marine piers' ramps that attach to decking have been damaged by storm-surge uplift and buoyancy
- Signage If sign panels and their supports have failed
- Gutters and Downspouts If damaged by either wind and/or water

At the time of publication, this was the most current information offered at www.fema.gov.
Readers should reference this site for continually updated information.

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## Overview of Other FEMA Hazard Mitigation Programs

Hazard Mitigation Grant Program (HMGP), Section 404

### **Program Purpose**

Identify and implement cost-effective mitigation measures that will reduce future disaster losses

- Coordinate mitigation needs with existing State and Federal efforts
- Capitalize on previous mitigation planning efforts to maximize the financial opportunities available under the HMGP
- Total Federal assistance cannot exceed 15 percent of the total estimated Federal assistance provided under Sections 403, 406, 407, 408, 410, 411, 416, and 601 of the Robert T. Stafford Disaster Assistance and Emergency Relief Act.
- FEMA may contribute up to 75 percent of the cost of measures approved for funding under the grant program for major disasters declared on or after June 10, 1993.
- The State and/or local share (which must be no less than 25 percent) may be met with cash or with in-kind services.



## **Funding Eligibility**

- Conform to the State Hazard Mitigation Plan developed as a requirement of Section 409.
- Provide a beneficial impact on the disaster area, including:
  - Projects located in the disaster area that address a site-specific problem
  - Projects located outside of the disaster area but having an impact on reducing damages in the disaster area
- Conform with environmental regulations such as:
  - Executive Order 11988, Floodplain Management
  - Executive Order 11990, Protection of Wetlands
  - National Environmental Policy Act
- Be cost-effective.

## **Preliminary Disaster Mitigation (PDM)**

#### **Program Purpose**

The PDM Program provides technical and financial assistance to States and local governments for cost-effective, pre-disaster hazard mitigation activities that complement a comprehensive mitigation program, and reduce injuries, loss of life, and damage and destruction of property.

FEMA provides PDM grants to States that, in turn, provide sub-grants to local governments for mitigation activities such as planning and the implementation of projects identified through the evaluation of natural hazards.

#### **Program Funding**

The PDM Program was authorized by §203 of the Stafford Act, 42 USC, as amended by §102 of the Disaster Mitigation Act of 2000.

Funding for the program is provided through the National Pre-Disaster Mitigation Fund to assist States and local governments in implementing cost-effective hazard mitigation activities that complement a comprehensive mitigation program.

To be eligible for PDM funding, applicants must participate in the NFIP and be in good standing (not on probation or suspended) if they have been mapped by FEMA.

## **Eligible Activities**

The PDM Program encompasses the following five eligible activities:

- Management costs (funding limited)
- Information dissemination (funding limited)
- Mitigation planning
- Technical assistance (for sub-grantees)
- Mitigation brick-and-mortar projects



## Flood Mitigation Assistance Program (FMAP)

#### **Program Purpose**

The FMAP provides funding to assist States and communities in implementing measures to reduce or eliminate the long-term risk of flood damage to buildings, manufactured homes, and other structures insurable under the NFIP.

#### **Program Funding**

The FMAP was created as part of the National Flood Insurance Reform Act (NFIRA) of 1994 (42 U.S.C. 4101) to reduce or eliminate claims under the NFIP. FMAP regulations can be found in 44 CFR Part 78. Funding for the program is provided through the National Flood Insurance Fund.

### **Grant Types**

- FMAP Planning Grants are available to States and communities to prepare Flood Mitigation Plans
- FMAP Project Grants NFIP-participating communities with approved Flood Mitigation Plans can apply for project grants. These grants are available to States and NFIP-participating communities to implement measures to reduce flood losses.
- Technical Assistance Grant Ten percent of the Project Grant is made available to States for technical assistance. These funds may be used by the State to help administer the program. Communities receiving FMAP Planning and Project Grants must be participating in the NFIP. A few examples of eligible FMA projects include the elevation, acquisition, and relocation of NFIP-insured structures.



## Severe Repetitive Losses (SRL) Program

The Severe Repetitive Losses (SRL) Program is designed to provide funding to projects that mitigate the damage to residential properties insured under the NFIP. The program is designed to reduce or eliminate repeated claims under the NFIP thorugh projects that will provide the greatest savings.

## The Flood Mitigation Assistance Program (FMA)

The FMA is made available to a State each year. The FMA Program provides grants to communities for projects that reduce the risk of flood damage to structures that have flood insurance coverage. This funding is available for mitigation planning and implementation of mitigation measures only. The State is the administrator of the FMA Program and is responsible for selecting projects for funding from the applications submitted by all communities within the State. The State then forwards selected applications to FEMA for an eligibility determination. Although individuals cannot apply directly for FMA funds, their local governments may submit an application on their behalf. Funding for the program is drawn from the NFIP and does not draw reserves from the Presidential Disaster Relief Fund.



Henderson Basin Flood Control Project, Cheyenne, WY

## **Community Assistance Program**

The CAP provides funding to meet negotiated objectives for reducing flood hazards in NFIP communities. The program intends to identify, prevent, and resolve floodplain management issues in participating communities before they require compliance action by FEMA. Available CAP funding is provided on a 75 percent Federal maximum and 25 percent minimum State cost-sharing basis through the annual FEMA-State Performance Partnership Agreements.

#### **Environmental Review Process**

When providing disaster response, FEMA must comply with a vast array of environmental laws, regulations, and Executive Orders. These laws and regulations are designed to protect our nation's natural, cultural, social, and economic resources for future generations. Among the many Federal environmental laws that may relate to FEMA-funded projects, the most often addressed include: the Clean Water Act, the Clean Air Act, the Coastal Barriers Resources Act, the Coastal Zone Management Act, the Resource Conservation and Recovery Act, the Endangered Species Act, the National Historic Preservation Act, and Executive Orders covering floodplains, wetlands, and environmental justice. Any project that receives Federal funding must comply with applicable Federal environmental and historic preservation laws, and the review must be completed before work can begin.

Tree planting after Wright, WY
Tornado August 2005

The keystone of all these regulations is the National Environmental Policy Act, or NEPA. In 1969, Congress enacted NEPA in response to public concern about the deteriorating quality of



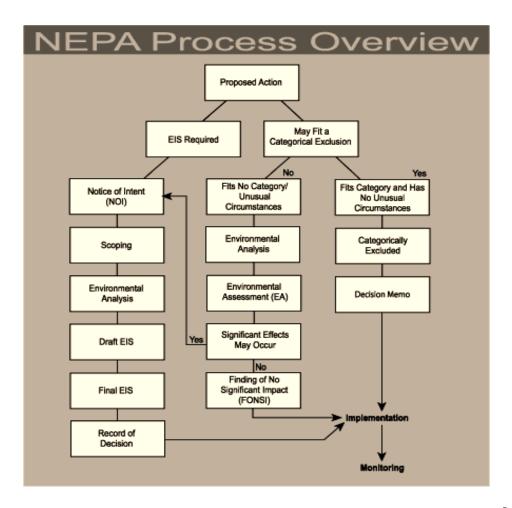
the nation's physical (air, water, and soils), natural (plants and animals), and cultural (archeology and historic structures) environment. NEPA takes a broad look at the environmental impacts of major Federal projects by <u>requiring</u> Federal agencies to include, along with the engineering and economic, an environmental perspective in project planning that evaluates potential impacts of the proposed project and ensures that an appropriate level of public involvement occurs.

#### **Environmental Review Process**

The following flowchart illustrates the environmental review process required by the NEPA. There are three levels of environmental review:

- 1. Categorical Exclusions (CATEX)
- 2. Environmental Assessments (EA)
- 3. Environmental Impact Statements (EIS)

For certain emergency actions, Congress granted FEMA Statutory Exclusion power, known as STATEXs. These are described in the Stafford Disaster Relief and Emergency Assistance Act and include administrative funding, debris removal, essential assistance such as food and other consumables, and search and rescue operations. Sections 402, 403, 406, 407, and 502 of the Stafford Act are statutorily excluded from NEPA review. Funding for mitigation projects is *not* a STATEX-able action.



#### NON-FEMA FEDERAL DISASTER ASSISTANCE PROGRMS

Many agencies play roles in the activation of the National Response Plan, and those agencies have disaster assistance programs. Some of the programs are only available when a Presidential Declaration of Disaster is made. Others provide assistance in lesser situations where the personal or business impact is great, but the event is not of a large enough scope to be considered a major disaster.

The State Homeland Security / Emergency Management Agency has responsibilities in preparing the Governor's request for either a Presidential or a Secretarial Disaster Declaration. The State must gather data to document the damages to ensure that businesses and individuals can receive the assistance needed. The type of information that is needed often parallels what FEMA would request in regard to a Presidential Declaration.



#### **U.S. Department of Agriculture (USDA)**

At the request of a State Governor or Indian Tribal Council, the Secretary of Agriculture can designate counties as disaster areas and provide emergency loan assistance for physical and production losses in those and contiguous counties.

The Farm Service Agency (FSA) provides assistance for natural disaster losses, resulting from drought, flood, fire, freeze, tornadoes, pest infestation, and other calamities.

**USDA** Disaster Assistance Programs:

- Assistance for Crop Losses (including Trees)
- Emergency Forest Restoration Program (ERFP)
- Assistance for Livestock Losses
- Emergency Farm Loans
- Emergency Conservation Program (ECP)



#### **U.S. Small Business Administration (SBA)**

SBA provides low interest disaster loans to homeowners, renters, businesses of all sizes and private, nonprofit organizations to repair or replace real estate, personal property, machinery and equipment, inventory and business assets damaged or destroyed in a declared disaster.

Type of Disaster Loans:

- Home and Personal Property Loans
- Business Physical Disaster Loans
- Economic Injury Disaster Loans
- Military Reservists Economic Injury Loans